

Comparisons of Job Characteristics

Focus Occupation: Architects, Except Landscape and Naval (17-1011)

Associated Occupation: Civil Engineering Technicians (17-3022)

[Compare Knowledge](#)

[Compare Skills](#)

[Compare Abilities](#)

[Compare Detailed Work Activities](#)

[Compare Tools and Technologies](#)

<<	Focus occupation element is much lower
<	Focus occupation element is lower
0	Focus occupation element is at a similar level
>	Focus occupation element is at a higher level
>>	Focus occupation element is at a much higher level

Knowledge

Similarity of Focus Occupation to Associated Occupation: 74

Focus Occupation: Architects, Except Landscape and Naval (17-1011)

Associated Occupation: Civil Engineering Technicians (17-3022)

Associated Occupation's Key Knowledge Elements	Average Rating, All Occupations	Associated Occupation's Rating	Focus Occupation's Rating		Evaluation of Focus Occupation
Engineering and Technology	5.7	15.6	20.3	>>	Current knowledge level is likely more than sufficient
Building and Construction	4.0	15.1	22.4	>>	Current knowledge level is likely more than sufficient
Mathematics	9.2	15.0	11.4	<<	Extensive education and/or training may be required
Design	5.2	14.1	25.0	>>	Current knowledge level is likely more than sufficient
Public Safety and Security	6.9	10.6	14.2	>>	Current knowledge level is likely more than sufficient
Geography	3.9	9.0	8.2	0	Current knowledge level may be sufficient
Transportation	4.6	8.6	5.8	<<	Extensive education and/or training may be required

The maximum possible rating is 25.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.

Skills

Similarity of Focus Occupation to Associated Occupation: 86

Focus Occupation: Architects, Except Landscape and Naval (17-1011)

Associated Occupation: Civil Engineering Technicians (17-3022)

Associated Occupation's Key Skills Elements	Average Rating, All Occupations	Associated Occupation's Rating	Focus Occupation's Rating		Evaluation of Focus Occupation
Reading Comprehension	10.7	12.9	14.9	>	Skill level is likely sufficient
Mathematics	6.2	8.7	11.7	>>	Skill level is likely more than sufficient
Operations Analysis	5.0	7.9	12.7	>>	Skill level is likely more than sufficient

The maximum possible rating is 25.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.

Abilities		Similarity of Focus Occupation to Associated Occupation: 95			
Focus Occupation: Architects, Except Landscape and Naval (17-1011) Associated Occupation: Civil Engineering Technicians (17-3022)					
Associated Occupation's Key Abilities Elements	Average Rating, All Occupations	Associated Occupation's Rating	Focus Occupation's Rating	Evaluation of Focus Occupation	
Oral Comprehension	12.5	12.8	15.4	>	Current ability level is likely sufficient
Near Vision	11.1	12.6	15.7	>	Current ability level is likely sufficient
Oral Expression	12.4	12.2	15.4	>>	Current ability level is likely more than sufficient
Deductive Reasoning	10.6	11.4	16.5	>>	Current ability level is likely more than sufficient
Visualization	7.5	11.4	16.9	>>	Current ability level is likely more than sufficient
Written Comprehension	11.0	11.4	14.5	>>	Current ability level is likely more than sufficient
Written Expression	9.8	11.4	13.4	>	Current ability level is likely sufficient
Problem Sensitivity	11.1	10.8	15.5	>>	Current ability level is likely more than sufficient
Mathematical Reasoning	6.3	10.3	12.4	>	Current ability level is likely sufficient
Number Facility	6.3	9.2	13.4	>>	Current ability level is likely more than sufficient
Memorization	5.6	6.9	6.4	0	Current ability level may be sufficient

The maximum possible rating is 25.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.

Activities that Both Occupations Have in Common		Similarity of Focus Occupation to Associated Occupation: 95
Focus Occupation: Architects, Except Landscape and Naval (17-1011) Associated Occupation: Civil Engineering Technicians (17-3022)		
Work Activities	Exclusivity of Activity	
Analyze scientific research data or investigative findings	27	
Analyze technical data, designs, or preliminary specifications	47	
Communicate technical information	4	
Confer with engineering, technical or manufacturing personnel	25	
Develop plans for programs or projects	31	
Draw maps or charts	69	
Draw prototypes, plans, or maps to scale	57	
Estimate cost for engineering projects	69	
Estimate time needed for project	64	
Evaluate costs of engineering projects	70	

Evaluate engineering data	60
Evaluate product design	78
Explain complex mathematical information	30
Inspect facilities or equipment for regulatory compliance	51
Inspect project operations, or site to determine specification compliance	72
Interpret aerial photographs	69
Interpret maps for architecture, construction, or engineering project	77
Judge distances	89
Prepare technical reports or related documentation	22
Read blueprints	10
Read maps	42
Read technical drawings	7
Recognize construction industry codes or symbols on blueprints	87
Resolve engineering or science problems	46
Understand construction specifications	53
Understand engineering data or reports	48
Understand property documents	77
Use building or land use regulations	65
Use computer aided drafting or design software for design, drafting, modeling, or other engineering tasks	58
Use drafting or mechanical drawing techniques	50
Use knowledge of regulations in surveying or construction activities	78
Use land surveying techniques	80
Use scientific research methodology	21
Use technical regulations for engineering problems	61

Not all positions in these occupations will necessarily perform all of the listed activities. The exclusivity rating is an indication of how unique the activity is amongst all occupations. The maximum rating is 100. High scores indicate that only a small number of occupations engage in that activity.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.

Tools and Technologies that Both Occupations Have in Common

Similarity of Focus
Occupation to Associated
Occupation: 53

Focus Occupation: Architects, Except Landscape and Naval (17-1011)

Associated Occupation: Civil Engineering Technicians (17-3022)

Tools and Technologies	Exclusivity
Computer printers	2
Computers	1
Content authoring and editing software	1
Cutting and crimping and punching tools	3
Industry specific software	1
Information exchange software	1
Measuring and layout tools	3
Network applications software	1

Not all positions in these occupations will necessarily use all of the listed tools and technologies. The exclusivity rating is an indication of how unique the tool or technology is amongst all occupations. The maximum rating is 100. High scores indicate that only a small number of occupations use that tool or technology.

Source: Alaska Department of Labor and Workforce Development, Research and Analysis Section analysis of O*NET (Occupation Information Network) data.